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Dear BEIS and Ofgem

SSE Group welcomes the opportunity to respond to the Joint BEIS and Ofgem consultation on proposals for a Future System Operator (FSO).

Please note that this response is provided on behalf of SSE Group (SSE)¹, and there will be additional responses from SSEN Distribution and SSEN Transmission.

About SSE

SSE plc is a UK-listed, FTSE-100 company and provider of low-carbon energy infrastructure. Our purpose is to provide energy needed today while building a better world of energy for tomorrow. Headquartered in Perth, SSE is a UK-listed energy company with operations and investments across the UK and Ireland.

SSE is primarily a developer, operator and owner of low-carbon energy assets and businesses, with a strategic focus on regulated electricity networks and renewable energy. Our purpose is to provide energy needed today while building a better world of energy for tomorrow, and our strategy is based on creating value for shareholders and society in a low-carbon world.

SSE is proud to be a Principal Partner of COP26 and its business strategy is firmly geared towards enabling the net zero transition for the whole energy system in the UK and Ireland. In November 2020, SSE joined the 'Race to Zero' campaign by committing to reaching net-zero emissions by 2050 at the latest and setting a relevant Science Based Target.

¹ SSE Group is formed of core SSE Renewables, SSEN Transmission and Distribution networks businesses, and complementary businesses SSE Thermal, SSE Energy Solutions, SSE Enterprise, and SSE Airtricity.

Summary of response

Roles and responsibilities for net zero

We understand that BEIS and Ofgem are reviewing options to drive progress towards net zero while maintaining energy security and minimising costs for consumers, an effort which we support. However, we do have concerns around the timing and content of this consultation, particularly in relation to the new and enhanced roles being considered and the implementation cost involved with the creation of a new body.

SSE's view is that urgent changes are required to strengthen the role of Ofgem to focus on the delivery of net zero. With the pending publication of the long-awaited Strategy and Policy Statement (SPS) consultation, we expect the roles and responsibilities of Ofgem in relation to the delivery of government energy policy to be clarified. Any change to Ofgem's remit or role will have a bearing on the requirement for, establishment, and responsibilities of the proposed FSO.

The case for an FSO

We do not believe that the case has been made for the creation of an FSO for the following reasons:

- With Ofgem as the regulator, the framework for an FSO must be really clear to avoid confusion. It must either be fully independent like Ofgem or a regulated entity.
- There is a lack of clarity around the governance arrangements including how day-to-day governance will be managed within the proposed new entity.
- We do not agree with the additional roles for the proposed FSO, including but not limited to advice provision, dispute resolution, and energy market design. These roles need to sit with parties who are clearly accountable for decisions i.e. BEIS and Ofgem.
- We have significant concerns over an FSO taking on the role of an Integrated Rule Making Body (IRMB). Determining code direction while simultaneously becoming the code manager for all codes would dilute the effectiveness of both functions and raise serious concerns over how conflicts of interest would be managed. Decision making should not lie with an FSO and should instead remain with Ofgem due to its underlying responsibilities as regulator.
- The impact assessment is predicated on perceived rather than evidence of actual conflicts of interest. This qualitative assumption is not an adequate judgement for such fundamental change.
- If the additional roles are not included, there is no need for total independence of National Grid Electricity System Operator (NGESO) from National Grid plc.

Current arrangements

We believe that the current arrangements with NGESO are adequate for the most part, however some improvements could be made to the roles that NGESO fulfils in order to focus effort and attention on the key enablers for net zero:

- Whole system licence conditions have only recently been introduced and provide a means to improve co-ordination and joined up planning.

- Utilising the NOA and expanding on TO/DNO/NGESO relationships as well as with the gas SO to ensure a holistic view is taken of the full network could resolve the issues that this consultation highlights
- Any change or new arrangements will need to be staged, informed by evidence and cost benefit analysis. The emphasis should be on the improvements that can be made that will help us all protect existing and consumers by meeting set, legal timescales for net zero.

We would also highlight that the GB energy industry has a strong track record over the last 30 years of private ownership driving efficient investment and improving performance for customers. Incentive based regulation has been proven to work and is best placed to help deliver net zero at lowest cost, so long as roles and responsibilities are clear, and companies can control their performance.

Competition in network solutions

It is vital that all related workstreams are taken into account to inform any decision on establishing an FSO. The separation of NGESO from National Grid plc would be necessary if Ofgem and BEIS seek to give an FSO additional responsibilities with regard to the introduction of competition for network solutions. The rules of competition cannot be designed until separation occurs as in this case the perception of a conflict of interest is likely to continue, particularly given National Grid Plc has an active Interconnector and Ventures division.

Role in system planning/network development

We disagree with the proposal that the FSO role would require it to undertake increased network planning responsibilities. It is our experience that system planning cannot be done in isolation from design, development, and delivery considerations. It is for this reason that system planning is not a standalone role in our transmission and distribution businesses and the function is deeply embedded. Network companies remain best placed to undertake system planning, as they have comprehensive end-to-end experience and knowledge of network solution implementation. Separating these activities would be sub-optimal and likely lead to inefficiencies and similarly the case for lifting them wholesale from one entity and placing it within the responsibility of another has not been justified.

Co-ordination with Distribution networks

We are concerned by the proposal for the FSO to potentially take on DSO functions in the future. NGESO does not have the required knowledge or experience of distribution network operation to take on DSO functions and with the whole system planning and operation obligations already enshrined in network operator licences it is unclear what value an FSO would bring to this area. Ofgem's RIIO-ED2 Sector Specific Methodology Decision places a clear requirement on each DNO to deliver DSO functions to meet Ofgem's minimum

requirements. There is a risk of mixed messages between RIIO-ED2 policy and system operation policy, which risks undermining investments.

Loss of people and expertise

The delivery of net zero must be a priority, and with change, particularly where the case has not been made, comes uncertainty. There is a concern that such a fundamental change as is being proposed may result in the loss of staff and therefore expertise in the ESO, which is critical to its efficient operation.

Conclusion

The creation of a new, additional independent body through separation represents fundamental structural reform and to achieve it in practice may be time-consuming and costly, requiring legislation and other substantial changes to the current framework which have not yet been quantified as part of BEIS/Ofgem's benefit analysis.

Ofgem and industry's collective focus needs to be on making decisions that will continue to facilitate and accelerate the transition to net zero in the most efficient and effective way for government, economy, environment and consumers.

Our detailed response to each question asked within the consultation document is attached and we look forward to engaging further with Ofgem and BEIS on these important issues.

Yours sincerely,

Katherine Marshall

Director of Markets Regulation and Group Compliance



Chapter 2

Questions in this section relate to

- The case for change

Question 1

Do you agree that net zero will create the need for new technical roles in the electricity and gas systems, and require a new approach to for energy system governance?

A ☒ Yes ☒ No

B

If not please explain why:

- We have not selected an option above as we agree that new technical roles will be required, however we do not agree that this will require a new approach to energy system governance.
- We also emphasise the need for new technical roles within Ofgem to enable Net Zero. This includes:
 - having an increased awareness of the level of generation required to meet Net Zero pathways to better assess TOs' local scenarios and understand that basing investment decisions on generation certainty alone isn't a pragmatic approach;
 - establishing a regime that facilitates risks and judgements. The regulatory regime must offer more flexibility to account for uncertain investments. Judgments and risks are increasingly required by Ofgem, which must reflect the new aims of achieving net zero, not only what has been learned from past experience.
- Having strong commercial understanding of infrastructure development and delivery, including challenges and nonlinearity of asset development, operation, and maintenance.
- The system governance framework underpins the delivery of net zero at best value for consumers, with the day to day roles, responsibilities and accountabilities of industry rightly set out in the various licences and Industry Codes and overseen by Ofgem.
- The framework provides detail and context supporting the efficient operation of industry trading arrangements; the orderly running of competitive markets to the benefit of consumers; and establishes a level playing field for all market participants.

- Ofgem and industry's collective focus needs to be on making decisions that prioritise and accelerate the transition to net zero in the most efficient and effective way for government, economy, environment and consumers including how they will measure their progress as facilitators of net zero.
- Any prospective changes to energy system governance must be focused first on clarifying existing roles and responsibilities rather than the creation of new roles. We therefore question whether major institutional reform, including the creation of a new body is really necessary.
- However, the separation of NGESO from National Grid would be necessary if Ofgem and BEIS seek to give an FSO additional responsibilities with regard to the introduction of competition for network solutions ahead of any introduction of legislation for a competitive framework.
- To achieve fundamental structural reform in practice may be time-consuming, requiring legislation and other substantial changes to the current framework which have not been quantified as part of the consultation's impact assessment.
- There is a risk that any changes made now are not lasting and that this process is repeated in a couple of years if change is made without the appropriate level of strategic direction from Government, with clear delineation of roles, responsibilities and accountabilities.

Question 2

Do you agree that the establishment of a Future System Operator is needed to fulfil the kinds of technical roles needed to drive net zero?

A ☐ Yes ☒ No

B

If not please explain why:

- As detailed above, clarity and changes to the current framework is needed to fulfil the roles needed to drive net zero, rather than the costly establishment of a new institution.
- We must not lose sight that the transition is already underway. There are already routes in the context of the current system governance framework where Ofgem and industry have and are taking action to achieve greater "whole system" co-ordination.
- System governance arrangements, including incentives and uncertainty mechanisms, are already an integral part of the current RIIO price control framework, the NOA and the system planning process. Although some improvements can be made, generally SSE considers these work well and have the necessary checks and balances in place.

- Rather than considering the creation of a new body, Government needs to provide clear strategic direction to Ofgem through the use of an SPS to drive forward decision making and deliver net zero. Aligned to this it should be recognised some costs may rise, and therefore trade-offs will have to be made between affordability for consumers today over strategic investment to protect the consumers of the future and deliver decarbonisation across the economy. Pace is essential to support the delivery of the strategic infrastructure investment necessary to meet net zero targets. Ofgem must be empowered to take risks and make judgements with confidence rather than be constrained by conflicting priorities which may prolong its decision-making and act as a barrier to net zero.

Question 3

Do you agree that a Future System Operator should have roles in both the electricity and gas systems?

A ☒ **Yes** ☐ **No**

B

- We do not have strong views on this, however there may be benefit in a holistic approach to system operation in the pursuit of net zero but we do not believe the creation of a separate entity is needed to facilitate this in practice.
- Greater co-ordination is needed within the whole industry, including NGESO and the gas SO. There could be better use of tools such as the Network Options Assessment (NOA) and the Future Energy Scenarios (FES) to facilitate this co-ordination.
- The benefits of a holistic approach to system operation would include greater insight to cost allocation to the benefit of market participants and consumers.

If not please explain why:

Question 4

Do you agree that a Future System Operator should be entirely separate from National Grid plc?

A

☐ Yes ☒ No

B

- Under the current arrangements and roles of responsibilities of NGESO, the current arrangements and separation between NGESO and National Grid plc are adequate.
- The case has not currently been made that separation and fundamental reform would provide benefit. We believe the level of risk that conflict of interest poses under current arrangement has been overstated and so the savings expected are also overstated, particularly when they are as noted in the impact assessment as having no evidence of conflicts of interest.
- However, we note that the separation of NGESO from National Grid is necessary if Ofgem and BEIS seek to give an FSO additional responsibilities with regards to the introduction of competition for network solutions. The rules of competition cannot be designed until separation occurs as the perception of a conflict of interest is likely to continue, particularly given National Grid Plc has an active Interconnector and Ventures division. However, we agree with Ofgem's comment that there is no evidence of NGESO being motivated by commercial interests.
- We do not agree with the additional roles of an FSO and so if an FSO was created with the same roles as NGESO, there would be less need for an FSO to be independent.

If not please explain why:

Question 5

What issues are there with existing institutional arrangements in the UK energy system in relation to system-wide decision-making and planning?

Please provide your answer below:

Roles and responsibilities

- Roles and responsibilities need to be clear, with the UK Government providing strategic direction to Ofgem, factoring in regional differences. We agree with the National Infrastructure Commission's call that, "Regulatory independence should be maintained, and government should better fulfil its role to set strategic policy direction and to provide guidance to the regulators, if requested, on choices about how the impacts of regulation will affect different groups of consumers". This is particularly relevant given the facilitating role that energy has to secure the transition to net zero across the economy where costs incurred e.g. investing in infrastructure to support electric vehicles should be offset against reductions elsewhere.

- Some work can be done to improve the relationships between NGESO, DNOs and TOs to ensure that a holistic view is taken of the full network. Thorough stakeholder engagement is completed in the development of business plans, as well as an understanding of the needs of local energy systems. Whole system licence conditions have only recently been introduced and provide a means to improve co-ordination and joined up planning to resolve some of the issues seen previously. Utilising the NOA and expanding on DNO/NGESO relationships could resolve the issues that this consultation highlights.
- NGESO's transparent engagement with Government and Ofgem, and vice versa is critical in such fundamental policy development. Early engagement with the wider industry and its stakeholders is also required to enable this group of participants to inject reality into policy-making and implementation, and for industry participants to prepare and challenge, where appropriate.

New and current policies must enable Net Zero

- Net Zero should be at heart of any policy development. Current policy developments are contradicting one another and delaying Net Zero delivery. Ofgem and BEIS must also carefully consider the practical implications as well as social and environmental impacts of their policy aspirations, rather than solely focussing on desk-top assessment reflecting economic theory rather than reality. Two examples that contradict Net Zero delivery include:
 - Competition (e.g. Pathfinders) is incentivising cheapest up front solutions, considering construction and supply chain savings over an arbitrary contract term, rather than the solution that is most efficient over the period of the system need (which will be variable) including operational and maintenance costs
 - The Transmission Network Use of System (TNUoS) charging methodology was originally designed to enable generation closer to demand. This outdated approach fundamentally ignores the reality now, that the areas of greatest renewable potential are not situated conveniently next to large demand centres.
- System governance arrangements, including incentives and uncertainty mechanisms, are already an integral part of the current RIIO price control framework, the NOA and the system planning process. Although they are not perfect, SSE considers these work well overall and have the necessary checks and balances in place.

Prioritise Net Zero in decision-making

- As we set out in Question 2, it should be recognised some costs may rise, and therefore trade-offs will have to be made between affordability for consumers today over strategic investment to protect the consumers of the future and deliver decarbonisation across the economy. Pace is essential to support the delivery of the strategic infrastructure investment necessary to meet net zero targets. Ofgem must be empowered to take risks and make judgements with confidence rather than be constrained by conflicting priorities which may prolong its decision-making and act as a barrier to net zero. As a result, some costs to consumers may rise as a result.
- The regulatory regime must offer more flexibility and forward-looking vision to account for "uncertain" investments to reach Net Zero. Net Zero requires the connection of high levels of generation in a timely and efficient manner. Anticipatory investment should be considered to enable Net Zero which allows networks to plan for investments with

certainty, at least ten years ahead. This holistic approach will also minimise the impact on local communities, protecting and enhancing the natural environment (including biodiversity), an approach which is currently being explored through the OTNR. Least cost, incremental, risk averse investments based on least worst regret analysis is a short-termist approach and should be avoided. These considerations must be undertaken by Ofgem as well as an FSO, if there is to be one.

- In our experience, the current priority issues for smart systems are the impact of changing markets (behaviours and participants); the access and charging regime; the strategic investment process (with particular emphasis on anticipatory and timely); policy uncertainty (in relation to support mechanisms and competition); and system planning across vectors.
- These issues are already being discussed extensively in existing industry workstreams and it is vital that solutions are based on evidence rather than theoretical grounds, particularly as we look ahead to RIIO-ED2 and RIIO-T3.

Question 6

What examples/case studies are you aware of where net zero delivery in one part of the energy system did not adequately account for cross-system impacts or costs?

Please provide your answer below:

- Pace in decision making and clear direction from government, using a holistic view, is vital for net zero delivery. An engaged and suitably resourced Ofgem bolstered by net zero statutory duties and a SPS will help to ensure that this happens. There is a real risk that energy does not move fast enough and that we have a bottleneck for infrastructure development.
- We recognise NGESO's objectives for competition, including onshore competition, Pathfinder, and offshore, however there are concerns across the industry that with regards to system planning, adopting a 'learning by doing' approach has possible consequences for the coordinated and efficient development of a transmission network to the overall benefit of GB consumers. This has been evidenced in the Offshore Transmission Network Review (OTNR) whereby the developer-led 'pathfinder' approach did not provide any solutions that demonstrated co-ordination between developers. Furthermore, the piecemeal development of the network and network system operability solutions may result in higher long-term costs for consumers, and loss of sustainability benefits. The individual cost of each solution to a network need may be marginally cheaper, but there could many whole system inefficiencies, resulting in triggering works elsewhere on the network.

- The case has now been made for reform of TNUoS charging², an area which we have highlighted is severely limiting progress in the transition to net zero. Government and Ofgem must work together with one or the other taking the lead to resolve this.
- The assessment of network solutions remains heavily focussed on cost efficiency, which while vital, must also be balanced with and set in the context of wider government, societal and environmental objectives. Whilst the current analysis tools and models (e.g. cost benefit analysis) served the network well in a world where we did not have challenging Net Zero targets, it is outdated and does not adequately balance the trade-offs between cost savings and what's required to deliver to Net Zero. A more efficient and agile response is required when identifying whole system and/or flexible solutions.

Question 7

Where should government focus in our efforts to improve systems thinking and co-ordination across the energy system?

Please provide your answer below:

- Government should clearly set out Ofgem's role and responsibilities in a Strategic Policy Statement to enable co-ordination and as the energy regulator Ofgem has a critical role to play in the transition its statutory duties should be strengthened and amended to explicitly include reference to achieving net zero.
- We very much support a whole system approach when it comes to meeting energy need in an area.
- We believe that whole system provides a consistent way of identifying a coordinated, efficient and timely investment to help deliver net zero.
- At this level the definition works across all energy networks and associated businesses, what varies is the whole system solution identified per geographic region. In the North of Scotland there is a massive over generation when compared with local demand. At a transmission level we have one directly connected demand customer. At the distribution interface we have c. 50 Grid Supply Points out of a total of c. 70 GSPs that regularly export to the transmission network. In that context there is reduced scope for demand services, certainly insufficient to absorb the excess distribution and transmission generation.
- This leaves generation services, which tend to result in paying generation to not export in the north, and then filling the supply gap in the south with dispatchable generation, typically CCGT. This poorly aligns with net zero ambitions.

² [ssen-transmission-offshore-tnuos-addendum .pdf](#)

- Understanding the variability driven by geographical location is important when identifying what is whole system. A one size fits all approach for all network companies will not deliver the same kind of solutions across the country.
- Two areas which we have highlighted previously that are severely limiting progress in the transition to net zero are TNUoS charging and Electricity Market Reform. Focus placed on these areas will open up investment in renewable infrastructure and should be prioritised by government.

Chapter 3

Questions in this section relate to

- What existing, enhanced and new roles and functions we consider a Future System Operator is well placed to take on to drive the transition to net zero.

Question 8

Do you agree that the FSO should undertake all the existing roles and functions of NGESO?

A

☒ Yes ☐ No

B

- If the decision is made to create an FSO, they should undertake all the existing roles and functions of NGESO to ensure that there is minimal impact on current arrangements. With change can come uncertainty and there is a concern that this may result in the loss of staff and therefore expertise in the ESO, which is critical to its efficient operation.

If not please explain why:

[Click here to enter text.](#)

Question 9

Do you agree there is a case for the FSO to undertake the gas strategic functions outlined in Option 1?

A

☐ Yes ☒ No

B

If not please explain why:

- Although in the long term there would be benefit in taking a holistic strategic approach to gas with the energy sector, the case has not been made in the consultation, with gas not been given due regard within the document.
- One solution to resolve this lack of co-ordination may lie in the Review of the Impact of a Gas Supply Shortage on the Electricity Network (RIGSSE) project, with further sharing of information between NGESO and gas SO.

Question 10

Do you agree that there is not currently a case for the FSO to undertake all GSO roles and functions, including real time gas system operation, as outlined in Option 2?

A

☒ **Yes**

☐ **No**

B

If not please explain why:

[Click here to enter text.](#)

Chapter 3 - New and enhanced FSO roles

Questions in this section relate to

- 3.2 in the FSO Consultation

Question 11

Do you have views on the proposal for an advisory role? What organisations do you consider would benefit from the provision of advice by the FSO?

Please provide your answer below

- Currently NGESO provides advice to industry and Ofgem in its role, with input from TOs, DNOs and other industry parties. Our understanding is that the way an FSO would differ

in this advice provision is that it will have separation from industry and therefore the advice could be viewed with less scrutiny. We do not think it would be appropriate for an FSO to have responsibilities for system operation and an advisory role as its advice will reflect its own role and views as SO. Its views should be treated like any other party in the energy system.

- Depending on the nature of the advice, rather than building up a separate public body i.e. an FSO, expertise could instead be placed into Ofgem to be able to understand and use the advice that has been provided by NGESO and other stakeholders including TOs, DNOs, generators and suppliers.
- NGESO has a limited role in challenging solutions put forward by TOs and DNOs. Its advice is based on inputs provided by asset owners. NGESO is not a network asset owner, has limited knowledge of the networks or how they are operated across the varied topography of mainland GB, and is removed from practical and pragmatic realities of system plans. It does not have experience in developing networks, nor costing solutions. An ESO that provides advice's role in challenging solutions will need to be confined to areas where the ESO has knowledge and oversight, for example, network access.
- We also ask for clarity in the challenge process, should network bodies disagree with advice of an FSO. This is one reason that why disputes must be managed by Ofgem, rather than a regulated industry participant.
- To provide holistic advice, NGESO would require significant upskilling. Currently in the industry, there is a significant skills shortage for roles such as system planners, control room engineers, etc. We welcome further evidence from Ofgem and BEIS as to how these gaps will be filled sustainably and effectively.
- Any advice provided by an FSO would need to be subject to the appropriate level of transparency, as it will be relied upon to make significant decisions. If this advice is used by Ofgem, how this advice is used must be open to consultation and the process around this must be clear.

Who should bear the costs of providing that advice?

- We do not believe this function should be part of an FSO, however the costs should be borne by those who receive benefit from the advice.

Question 12

Do you have any views on the other areas where we are considering new and enhanced roles and functions for the FSO (outlined in section 3.2)?

Please elaborate:

- We do not agree with the new and enhanced roles being proposed.
- *Role in system planning/network development*
 - We are concerned with the proposal that the FSO role would require it to undertake increased network planning responsibilities. It is our experience that system planning cannot be done in isolation from design, development, and delivery considerations. It is for this reason that system planning is not a standalone role in our transmission and distribution businesses and the function is deeply embedded. Many teams with various specialisations contribute to system planning and development. These include project development (including consenting), engineering, commercial, customer and stakeholder engagement, environment, wayleaves/land, asset operation and network control centre (including outage planning).
 - Network companies remain best placed to undertake system planning, as they have comprehensive end-to-end experience and knowledge of network solution implementation. System planning is intimately connected to network development teams. Early optioneering and analysis on deliverability is undertaken hand-in-hand with system planning. TOs are able to implement synergies across a portfolio of load and non-load related works, as well as operational expenditure, to find efficiencies for optimum solutions and management. We are also able to benefit from economies of scope and scale by identifying and bundling projects to obtain volume discounts and efficiency in delivery programmes. This efficient methodology has evolved during decades of network development. Separating these activities would be sub-optimal and likely lead to inefficiencies and similarly the case for lifting them wholesale from one entity and placing it within the responsibility of another has not been justified.
- *Role in energy code development*
 - We have significant concerns over an FSO taking on the role of an Integrated Rule Making Body (IRMB). Determining code direction while simultaneously becoming the code manager for all codes would dilute the effectiveness of both functions and raise serious concerns over how conflicts of interest would be managed. Decision making should not lie with an FSO and should instead remain with Ofgem due to its underlying responsibilities as a regulator.
 - Whilst we welcome the inclusion of engineering standards within the scope of the energy code review, we do have concerns around an FSO recommending engineering standards. TOs and DNOs continue to be most suitable for this role, as they have extensive knowledge of the assets they operate and have expert engineering teams who are best placed in devising these standards. Network licensees can also provide guidance, views and expertise on practical implementation and wider impacts on the network. In general, network companies should play a more active role in code governance relating to our users, as it affects and impacts networks. There should be a formal process and engagement with any future code manager for ensuring sufficient network licensee input into any future code amendments.

- More importantly, it should be noted that the energy system has moved on significantly since the current code objectives were set and a review could ensure consistency of decision-making and acknowledge the inter-relationships between codes. We would strongly welcome a review of code objectives, particularly to specifically include net zero as an objective.
- *Dispute resolution*
 - This should remain with Ofgem as the independent regulator.
- *Driving competition*
 - We re-iterate our concern regarding the introduction of competition onto onshore and offshore transmission networks and direct BEIS and Ofgem to our responses to NGEESO's Phase 3 Competition³ and Ofgem's recent consultation on its views on early competition⁴ and the OTNR⁵. Competition can:
 - extend the delivery of transmission infrastructure, delay Net Zero, and rather than reducing costs for consumers, can increase costs by extending constraint payments;
 - create uncertainty and therefore investment and delivery bottlenecks. Developers and the supply chain will not have a clear route to market or a defined pipeline of projects;
 - create a "race to the bottom" and sacrifice benefits of a natural monopoly such as high sustainability standards, and economies of scale and scope; and,
 - create a fragmented network and threaten the network's security of supply and reliability.
- *Market design*
 - Government should still be responsible for capacity market design and improvements should be made to Ofgem's role to meet net zero.
 - The role that an FSO could take would depend on the ownership model and transitional arrangements. But ultimately it should still sit with government.
- *Heat and transport decarbonisation*
 - Currently we do not believe NGEESO necessarily has the expertise to deal with these subjects, and the largest input can be made at a local level. Increased co-ordination with DNOs will help to enable this.
- *Distribution network co-ordination*
 - We are already seeing some complex interplays between the operation of the Transmission and Distribution systems in our region and are actively working with the ESO on regional development plans. It would be helpful to clarify and formalise these co-ordination roles so that responsibility and accountabilities are clear. However, we are concerned by the proposal for the FSO to potentially take on DSO functions in the future. The ESO does not have the required knowledge or experience of distribution network operation to take on DSO functions and with

³ <https://www.nationalgrideso.com/document/190366/download>

⁴ Documents attached to response.

⁵ Documents attached to response.

the whole system planning and operation obligations already enshrined in network operator licences it is unclear what value an FSO would bring to this area. Ofgem's RIIO-ED2 Sector Specific Methodology Decision places a clear requirement on each DNO to deliver DSO functions to meet Ofgem's minimum requirements. There is a risk of mixed messages between RIIO-ED2 policy and system operation policy which risks undermining investments.

- *Data*
 - Managing data would be critical to the success of an FSO, and it does have experience in balancing the system and providing data through the NOA and FES.

Chapter 4

Questions in this section relate to

Organisation Design

- The high-level characteristics and detailed attributes which we consider are needed to achieve this, and seeks views on two different organisational models and the extent to which they meet these characteristics and attributes.

Question 13

What are your views on our proposed characteristics and attributes of a future system operator and how the models presented would deliver against them?

Please provide your answer below

- We would agree that the proposed characteristics and attributes would be required for the FSO to be successful if it is determined that it should exist.

Are there other characteristics or attribute that we have not yet considered?

- Transparency on any decisions made would be vital to ensure an FSO could be held accountable. This transparency could be achieved through monitoring and reporting through its annual report similar to Ofgem, as well as the detailed publication of any decisions or advice provided.
- It would be beneficial for an FSO to have the achievement of net zero explicitly set out within its objectives to ensure it can remain focused and be held accountable if its performance falls short.

Question 14

Are we considering the right organisation models for the FSO? And why?

Please provide your answer below

- The introduction of any model would require careful consideration around its structure and what is it targeted with achieving so progress can be measured. The right incentives must be introduced with consumer benefit and net zero at the forefront.
- We do not think it would be appropriate for an FSO to have responsibilities for system operation and an advisory role as its advice will reflect its role and views as SO. Its views should be treated like any other party in the energy system.
- The role of an FSO would be heavily influenced by the role of Ofgem, and therefore as above, it is vital the roles and responsibilities of Ofgem are made clear in primary legislation and set out in a SPS before deciding on the role of an FSO.

Question 15

Are we considering the right elements for the FSO's regulatory and accountability frameworks?
And why?

Please provide your answer below

- It is difficult to answer this question as we do not currently believe the case has been made for the creation of an FSO.
- As above, the ownership model needs to be driven by clarity in relation to the role of an FSO and net zero governance from the government down.
- With Ofgem as the regulator and to be able to fulfil the roles being proposed, the framework for an FSO must be really clear to avoid confusion. It must either be fully independent like Ofgem or a regulated entity. A hybrid entity which is both regulated but providing advice which might affect its own position provides concerns around conflict of interest. Clarity must be provided on what is being considered for a model to be endorsed.
- Making the FSO a public entity would need to ensure that protections are in place to make it sufficiently independent from Government. There is a danger that it is politically influenced and used as a tool to deliver short term political objectives. Long term focus on climate change goals is vital.
- We would also highlight that the GB energy industry has a strong track record over the last 30 years of private ownership driving efficient investment and improving performance for customers. Incentive based regulation has been proven to work and is best placed to help deliver net zero at lowest cost, so long as roles and responsibilities are clear, and companies can control their performance.

Question 16

Do you have views on the level of shareholding or control involving other ‘energy interests’ and the FSO at which a conflict of interest would become a concern?

Please provide your answer below

- Even as a fully independent business there is a conflict of interest between system operation and advisory roles.
- It is vital that all related workstreams are taken into account to inform any decision on establishing an FSO. The separation of NGE SO from National Grid plc would be necessary if Ofgem and BEIS seek to give an FSO additional responsibilities with regard to the introduction of competition for network solutions. The rules of competition cannot be designed until separation occurs as in this case the perception of a conflict of interest is likely to continue, particularly given National Grid Plc has an active Interconnector and Ventures division.

Question 17

Are we considering the right implications of our proposals for Elexon and Xoserve?

Please provide your answer below

- We have no view to share on this at this time.

Chapter 5

Questions in this section relate to

Implementation

- A preferred high-level approach for implementation of the FSO with the aim of seeking views on how the FSO can best implemented in practice

Question 18

What is your view on the preferred implementation approach?

Please explain why

- As we have noted above, if it is determined to proceed, a phased approach would be recommended to ensure there are no interruptions to the day to day operations of the ESO.

- It is important that the knowledge base of the ESO should be retained through transition to the new arrangements to avoid potential loss of resource and expertise due to uncertainty i.e. change of ownership.
- There is a risk during implementation that this causes disruption to the transition already underway and detracts from workstreams more important to reaching net zero (TNUoS reform, Electricity Market Reform).
- The consultation for NGENSO's business plan guidance for the next price control has recently been opened. If an FSO is being created, it would be best for it to coincide with the next set of price controls, however work will already be underway for 2026, so we would suggest 2031 is considered.
- Changes will require legislation to be amended/created, and must be done in tandem with wider changes including the role of Ofgem and the provision of a SPS. That way, all parties have a clear understanding of the direction of the legal and regulatory framework. Changes which have biggest impact on the pursuit of net zero should be prioritised.

Question 19

Based on the areas where we are considering new and enhanced roles and functions for the FSO, which of these should be prioritised for development?

Please explain why

- The creation of an FSO is not a priority, and other areas including the role of Ofgem and the provision of a SPS should come first, before collecting views on the creation of a separate body. This will ensure roles, responsibilities and accountabilities are clear and do not need to be revised further down the line.
- Any changes that are proposed must also have clear evidence that they will help towards the delivery of net zero, and then they should be prioritised in order of value towards meeting that delivery.

Question 20

What do you believe are the risks to implementation?

Please provide your answer below

- If an FSO is created before the role of Ofgem and wider system governance has been corrected, there is a risk that the wider governance framework changes while the implementation to an FSO is underway. This may result in wasted effort up to that point if a later decision is made to not create an FSO, or worse, the creation of an FSO is later deemed an error.

- Ofgem, BEIS and the ESO will all have an important role to play in reaching the UK's legally binding net-zero objectives. It is vital that all roles and responsibilities are outlined by BEIS, including in legislation where required and accompanied by a strong SPS.
- We ask Ofgem and BEIS to provide visibility of the timelines of key decision points as soon as possible, as the FSO proposals introduce real risks of disruption for the energy system as a whole and for market participants. Transmission Operators require early insights to understand key impacts on everyday operation ahead of RIIO T3 development. The lack of certainty will be disruptive and mean that planning cannot be properly started until this uncertainty has been resolved.
- As noted above, the loss of expertise from the ESO during implementation is a risk which would reduce any proposed benefit of the creation of an FSO.
- Uncertainty caused by the creation of an FSO, particularly in relation to its roles and responsibilities makes it difficult for network operators to manage their networks and deliver against their RIIO settlements. The industry is currently undergoing unprecedented uncertainty. Introducing a new FSO could add more uncertainty which may constrain more renewable generation deployment as well as the solutions required to support decarbonisation across the economy.

How can these be mitigated?

- The wider system governance must be first settled before fundamental changes such as these are decided.
- Any changes, including the creation of an FSO, must have clear evidence and cost benefit justification for being made.

Question 21

Do you have any comments on potential implications of implementation for you, your organisation, or other stakeholders?

Please provide your answer below

- It must be clear that this will have implications for all industry parties.
- Time and resource will be required to deal with the changes being made, including responding to the numerous consultations and participation in the likely industry workstreams established to consider the detail.
- It is important that there is a clear and transparent process in what constitutes a fundamental change to the energy sector, which must not undermine or create uncertainty at a time when investment is needed to facilitate net zero.
- Clear decision making is required, and delivery is needed at pace. Poorly informed or planned decisions at this time will be at the detriment of consumers and the delivery of net zero. All changes must have clear evidence behind them.

- Implementation of a new FSO could delay analysis and support on LOTI projects including projects to connect offshore wind.
- Legislation, role transfers and identifying code structures are fundamental changes to the energy industry and will take significant time and resource to implement correctly.
- The benefits case for an FSO has been focused on efficiency between industry parties i.e. whole system, and not focused on connecting customers or Net Zero, therefore a significant stakeholder group has therefore been missed. This will undoubtedly have an impact on both current customers in the process of connecting and future customers as any transfer of business will have some associated level of disruption.

Chapter 6

Questions in this section relate to

Impact assessment

- FSO Impact assessment which is presented alongside this consultation to assess the likely costs, benefits and distributional impacts of the policy options considered

Question 22

What is your view on the position there are likely to be cost savings across the energy system from an increased “whole system” view, as described in paragraphs 50-55 of the IA?

A

Please provide your answer below

- We do not believe that enough clarity or evidence has been provided to come to the values described in the IA.

B

If so, is the potential magnitude of savings illustrated fairly in the IA?

- No.

C

If not, why not?

- The impact assessment in paragraph 47 states that “no evidence of such a conflict being acted upon under the current arrangements” so it is unclear how changes would lead to savings. The values provided are purely a qualitative judgement and therefore should

not be used as an evidential base for decision making. As above, we are opposed to the additional roles that are being proposed for the FSO.

- Rather than providing an illustrative example of 1-5%, it would be more beneficial to provide an estimate with forecasts.
- It is unclear from the IA how RIIO 2 has been factored in and there is a concern that the assessment ignores items currently in train.
- Many of the benefits, including promoting innovation, is currently already undertaken through the price control frameworks. In addition, there is currently a re-opener mechanism in place which allows licensees to consider and implement whole system solutions (CAM), as well as whole system licence conditions. It is not clear if there are costs savings related to this mechanism, and whether or not the FSO savings of 1-5% take this mechanism into account.
- If an FSO is to be implemented, there needs to be a performance review to determine if benefits are realised. The Government's Green Book states that benefit realisation through monitoring and evaluation should be determined as part of the wider IA process⁶.

Question 23

What is your view on the conclusion that policy intervention is likely to increase the benefits of onshore electricity network competition, as described in paragraphs 53-59 of the IA? If you agree, is the potential magnitude of savings illustrated fairly in the IA? If not, why not?

A

Please provide your answer below

- We do not believe that enough clarity has been provided to come to the values described in the IA.

B

If not, why not?

- Firstly, the benefits of competition in onshore transmission set out in the most recent IA by Ofgem cannot be relied on and are wholly unrepresentative, regardless of who is the authority or Procurement Body in the process. We note that expected net benefits set out in the IA are based on the 2016 Impact Assessment, which is out of date and does not reflect new Net Zero ambitions. An updated IA by BEIS (late competition) and Ofgem (early competition) has recently been published, however we think there are

⁶ <https://www.gov.uk/government/publications/the-green-book-appraisal-and-evaluation-in-central-government>

shortcomings in the analysis, as we set out in our response to Ofgem's consultation on its views on early competition.⁷

- Secondly, suggesting that policy intervention (i.e introducing an FSO) contributes to 25-50% additional benefit for onshore electricity competition is overstated and unsubstantiated, and tenuous at best. Materialisation of the claimed benefits is dependent on many other factors including risk profile and appetite of potential competitors, capability within decision-making bodies; continued engagement and input from network companies, etc. A transfer of skills from the NGESO to an FSO cannot provide the significant savings claimed by the IA.

Question 24

Do you think that the impact assessment has identified and considered the key costs and benefits of policy intervention?

A

☐ Yes ☒ No

B

If not, can you provide details on other impacts that have not been considered?

- Whilst the impact assessment includes a sufficient variety of costs and benefits, it is not explicitly mentioned how the introduction of a new FSO will contribute to carbon abatement and in turn, the achievement of net zero goals.
- The rationale provided for the creation of an FSO is that it will help with the delivery of net zero. If the evidence on this is not clear, or if the evidence does not show how the FSO would be better than the current framework but will come at a cost, then it should not be done.

Question 25

Do you think that the distribution of impacts is fairly represented, with impacted groups correctly identified? Outlined in table 5 of the IA.

A

⁷ Document attached.

☐ Yes ☒ No

B

If not, why not?

- A large impact is the increased uncertainty in system governance structure, particularly at a time where investment is required to meet net zero.
- There is no evidence to suggest these benefits will materialise. A new body may add additional complexity into an energy system that is already high performing. We ask Ofgem and BEIS to articulate the specific barriers to whole system thinking and Net Zero, and why the current arrangements cannot be amended to address them.
- Furthermore, we again emphasise the clear lack of consideration to delays to Net Zero institutional reform can bring. The IA does not reflect best practice set out in the Government's Green Book on accounting for socio-economic value and is focussed solely on cost efficiency.
- The internal resource to participate in government policy consultation process and familiarisation/learning costs could be better spent elsewhere.
- We would debate whether there would indeed be improved trust in SO decisions, as we believe that the current separation in place is adequate and the same level of scrutiny would be required on advice given by the FSO if separated from National Grid plc.
- It is critical that the risk to security of supply during any ownership transition is mitigated as a priority.

Question 26

We invite respondents' views on whether the proposals for energy system governance reform may have a different impact on people who have a protected characteristic (age, disability, gender re-assignment, marriage and civil partnership, pregnancy and maternity, race, religion or belief, sex (gender) or sexual orientation), in different ways from people who don't have that characteristic.

Please provide any evidence that may be useful to assist with our analysis of policy impacts.

Nothing to add.

Do you have any other comments that might aid the consultation process as a whole?

Please use this space for any general comments that you may have, comments on the layout of this consultation would also be welcomed.

Nothing to add.

Thank you for your views on this consultation.

Thank you for taking the time to let us have your views. We do not intend to acknowledge receipt of individual responses unless you tick the box below.

Please acknowledge this reply ☒

At BEIS we carry out our research on many different topics and consultations, and your views are valuable to us. Would you be happy for us to contact you again from time to time either for research or about other consultations?

☒ Yes

☐ No